Notice of Allowability	Application No.	Applicant(s)	
	09/729,171	IKEDA, AKIO	
	Examiner	Art Unit	
	Justin R Fischer	1733	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to *5 April 2004*.

2. ☒ The allowed claim(s) is/are *1, 4, 7, 8, 11-18 (renumbered 1-12)*.

3. ☒ The drawings filed on *05 December 2000* are accepted by the Examiner.

4. ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
   a) ☐ All b) ☐ Some* c) ☒ None of the:
      1. ☒ Certified copies of the priority documents have been received.
      2. ☐ Certified copies of the priority documents have been received in Application No. _____ .
      3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

   * Certified copies not received: *JP 11-348064*.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

5. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.

6. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
   (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
      1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
   (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.

   Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).

7. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☒ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)
3. ☐ Information Disclosure Statements (PTO-1449 or PTO/SB/08), Paper No./Mail Date _____
4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material
5. ☐ Notice of Informal Patent Application (PTO-152)
6. ☐ Interview Summary (PTO-413), Paper No./Mail Date _____ .
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other _____.

EXAMINER'S AMENDMENT

1. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Edward Valence on April 30, 2004.

in the claims:

Claims 1 and 15 are rewritten as follows:

1. A pneumatic tire comprising

a tread portion,

a pair of sidewall portions,

a pair of bead portions each with a bead core and a bead apex therein,

each said sidewall portion provided on the outer face with means of escaping air between the tire and a mold for vulcanizing the tire,

said means comprising

a circumferentially extending, axially outwardly protruding vent emboss line disposed adjacently to a radially outer end of the bead apex and

a circumferentially continuously extending vent groove adjoining the radially outside of the vent emboss line,

wherein a radial distance of the vent emboss line from the radially outer end of the bead apex is in a range of from +3 mm to –10mm,

the sidewall portions each provided with a lower sidewall region having a substantially straight profile in a [tire] meridian section [and extending] of a finished tire under inflation pressure of 5% of the standard pressure or a tire in the vulcanization mold, wherein said profile extends radially inwardly from [a] an originating position (b) radially inside the maximum tire section width point towards the bead portion to a terminating position (c) wherein the position (b) is at a radial height (Hb) in a range of from 85 to 98% of the radial height (H) of the maximum tire section width point, and the position (c) is at a radial height (Hc) in a range of from 30 to 50% of said radial height (H), and

said vent emboss line and vent groove disposed within said lower sidewall region so that a part of the lower sidewall region having a positive extent is left on the radially outside of said vent groove and the radially inside of said vent emboss line,

the vent groove having a width in a range of from 5 to 10 mm and a depth in a range of from 0.15 mm to 0.5 mm from the straight profile, and

the vent emboss line having a protruding height in a range of from 0.3 mm to 2.5 mm from the straight profile.

15. A pneumatic tire comprising

a tread portion,

a pair of sidewall portions,

a pair of bead portions each with a bead core and a bead apex therein,

each said sidewall portion provided on the outer face with means of escaping air between the tire and a mold for vulcanizing the tire,

said means comprising

a circumferentially extending, axially outwardly protruding vent emboss line disposed adjacently to a radially outer end of the bead apex and

a circumferentially continuously extending vent groove adjoining the radially outside of the vent emboss line,

wherein a radial distance of the vent emboss line from the radially outer end of the bead apex is in a range of from +3 mm to –10mm,

the sidewall portions each provided with a lower sidewall region having a substantially straight profile in a [tire] meridian section [and extending] of a finished tire under inflation pressure of 5% of the standard pressure or a tire in the vulcanization mold, wherein said profile extends radially inwardly from [a] an originating position (b) radially inside the maximum tire section width point towards the bead portion to a terminating position (c) wherein the position (b) is at a radial height (Hb) in a range of from 85 to 98% of the radial height (H) of the maximum tire section width point, and the position (c) is at a radial height (Hc) in a range of from 30 to 50% of said radial height (H), and

said vent emboss line and vent groove disposed within said lower sidewall region so that a part of the lower sidewall region having a positive extent is left on the radially outside of said vent groove and the radially inside of said vent emboss line,

the vent groove having a width in a range of from 5 to 10 mm and a depth in a range of from 0.15 mm to 0.5 mm from the straight profile, and

the vent emboss line having a protruding height in a range of from 0.3 mm to 2.5 mm from the straight profile, wherein the bead apex is made of hard rubber having a hardness of from 68 to 90 when measured in the tire radial direction with a type-A durometer according to Japanese Industrial Standard K6253.

Allowable Subject Matter

2. Claims 1, 4, 7, 8, and 11-18 (renumbered 1-12) are allowed. The following is an examiner's statement of reasons for allowance:

It is well known in the tire industry to include a circumferentially continuous groove along the tire sidewall outer surface and more particularly, it is recognized by Mori (Figure 1) that it is especially desirable to position such a circumferential continuous groove in a rim cushion region that extends radially outward from the rim flange height a distance equal to 10% of the section height. The region defined by Mori is consistent with that required by the claimed invention. However, it is evident that the tire construction of Mori does not define a substantially straight profile in the tire sidewall over a distance originating from a point (b) located at a radial height in a range of from 85 to 98% of the radial height of the maximum tire section width point and terminating at a point (c) located at a radial height in a range of from 30 to 50% of the radial height of the maximum section width point. The amended language of the claim defining an "originating position (b)" and a "terminating position (c)" is used to positively define the

extent of the straight profile- the straight profile does not extend radially outward of the originating point (b) nor does it extend radially inward of the terminating point (c). While the use of a straight profile over a significant portion of the tire sidewall (Stumpf, DE 3625226)) and the use of a straight profile over segments of the tire sidewall (Kaba, US 4,947,913) are known, the prior art references fail to suggest the inclusion of a straight profile between the specified originating and terminating points. As such, the references fail to suggest, disclose, or teach a tire construction having a vent emboss line and vent groove as defined by the claimed invention (radial arrangement, width, height), wherein the tire sidewall is formed as a substantially straight profile between an originating point (b) located at a radial height in a range of from 85 to 98% of the radial height of the maximum tire section width point and a terminating point (c) located at a radial height in a range of from 30 to 50% of the radial height of the maximum section width point.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Justin R Fischer** whose telephone number is **(571) 272-1215**. The examiner can normally be reached on M-F (7:30-4:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Crispino can be reached on (571) 272-1226. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Justin Fischer

April 30, 2004

JEFF H. AFTERGUT
PRIMARY EXAMINER
GROUP 1300